Warm-up



Estimate the difference

14.15 - 9.56

14 - 10

4

Rounding

Find the actual

https://www.youtube.com/watch?v=P7ozJW8LSxw

Can you add:

a) 4521849 + 36130

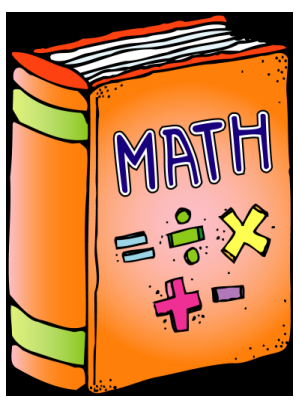
$$\begin{array}{r} 4521849 \\ +\ \ 36130 \\ \hline 4557979 \end{array}$$

Can you subtract:

a) 56281-6286

$$\begin{array}{r} 56281 \\ -\ 6286 \\ \hline 49995 \end{array}$$

If you can add and subtract using long addition & subtraction, you will be able to add and subtract decimals!



Add or Subtract Decimals



To add or subtract decimals, follow these steps:

> Write the numbers one under the other, with the decimal points lined up.

> Put in zeros so the numbers have the same length

> Then add or subtract, using column addition, remembering to put the decimal point in the answer lined up.

Add or Subtract

↳ the decimal (•) lines up

a) 17.6+ 0.25

$$\begin{array}{r} 17.60 \\ +\ 0.25 \\ \hline 17.85 \end{array}$$

b) 56.3 - 11.75

$$\begin{array}{r} 5\ 12\ 10 \\ 5\not{6}.\not{3}0 \\ -\ 11.75 \\ \hline 44.55 \end{array}$$

c) 20 + 8.2

$$\begin{array}{r} 20.0 \\ +\ 08.2 \\ \hline 28.2 \end{array}$$

d) 11.6 - 5.06

$$\begin{array}{r} 0\ 11\ 5\ 10 \\ 1\not{1}.\not{6}0 \\ -\ 5.06 \\ \hline 6.54 \end{array}$$

You try:

a) 45.181+ 6.2810

$$\begin{array}{r} 45.1810 \\ +\ 6.2810 \\ \hline 51.4620 \end{array}$$

b) 60.98

$$\begin{array}{r} 5\ \ 10 \\ \cancel{60}.9871 \\ -\ 41.2000 \\ \hline 19.7871 \end{array}$$

Worksheet

Name:_____

Students must show all math work to earn full value.

Only estimate when asked to estimate. (If not then just add or subtract normally showing work)

1. Use front-end estimation to estimate each sum or difference.

a) 3.478 - 0.846

b) 79.216 + 5.21

c) 147.14 + 34.97

d) 10.9- 1.47

2) Tim travels the same road to get to his grandmothers house and his friend Karen's house. If the distance from Tim's house to his grandmother's house is 0.743 km and the distance from Karen's house to Tim's house is 0.476 km, then what is the difference in the distance from Karen's house to Tim's Grandmothers

3) Four classes of students at Blackville are planning a trip. The total cost is $2048.50. To date the classes have raided: $376.15, $424.05, $231.24, $376.75.

a) How much money have the classes raised so far?

b) How much more money do the classes need to raise in total?

4) A chef is preparing 3 different types of pasta dishes. The recipes require 1.8 kg, 3.25 kg, and 4.6 kg of pasta. The chef has 8.5 kg of pasta available.

a) How many kilograms of pasta does the chef need in total? Estimate to check if your answer is reasonable.

b) Does the chef have enough pasta to make all the dishes? How can you tell?

c) If the chef wants to follow the recipes exactly, and your answer to part b is no, how many more kilograms of pasta are needed? If your answer to part b is yes, how much pasta will be left over?

5) Estimate, then calculate, the sum below. Explain how you estimated: 35.42 + 7.8 + 2.135

6) The Lopez family and the Patel family have similar water usage habits.

The Lopez family does not use water-saving fixtures. Their monthly water bills were: $87.50, $92.30, and $78.45.

The Patel family installed water-saving fixtures in their home. Their monthly water bills were: $65.40, $58.75, and $62.10.

a) How much money did each family spend on water during the three months?

b) How much more money did the Lopez family spend? Estimate to check your answer is reasonable.

c) What other measures could a family take to reduce their water bills?